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| APPLICATION NO. | FILING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. |
|-----------------|-------------|----------------------|---------------------|------------------|
| 09/632,519      | 08/04/2000  | Russell A. Houser    | 23,393-37           | 1493             |

7590

12/23/2003

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| EXAMINER |
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MENDEZ, MANUEL A

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| ART UNIT | PAPER NUMBER |
|----------|--------------|

3763

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DATE MAILED: 12/23/2003

Please find below and/or attached an Office communication concerning this application or proceeding.

# Office Action Summary

Application No.

09/632,519

Applicant(s)

HOUSER, RUSSELL A.

Examiner

Manuel Mendez

Art Unit

3763

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

## Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

## Status

- 1) ☒ Responsive to communication(s) filed on 29 September 2003.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

## Disposition of Claims

- 4) ☒ Claim(s) 1-29 is/are pending in the application.
- 4a) Of the above claim(s) 9, 15, 21, and 22 is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-8, 10-14, 16-20 and 23-29 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

## Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

## Priority under 35 U.S.C. §§ 119 and 120

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).  
a) ☐ All b) ☐ Some \* c) ☐ None of:  
1. ☐ Certified copies of the priority documents have been received.  
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.  
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).  
\* See the attached detailed Office action for a list of the certified copies not received.
- 13) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application) since a specific reference was included in the first sentence of the specification or in an Application Data Sheet. 37 CFR 1.78.  
a) ☐ The translation of the foreign language provisional application has been received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121 since a specific reference was included in the first sentence of the specification or in an Application Data Sheet. 37 CFR 1.78.

## Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892) 4) ☐ Interview Summary (PTO-413) Paper No(s). \_\_\_\_\_
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948) 5) ☐ Notice of Informal Patent Application (PTO-152)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449) Paper No(s) \_\_\_\_\_ 6) ☐ Other: \_\_\_\_\_

**DETAILED ACTION**

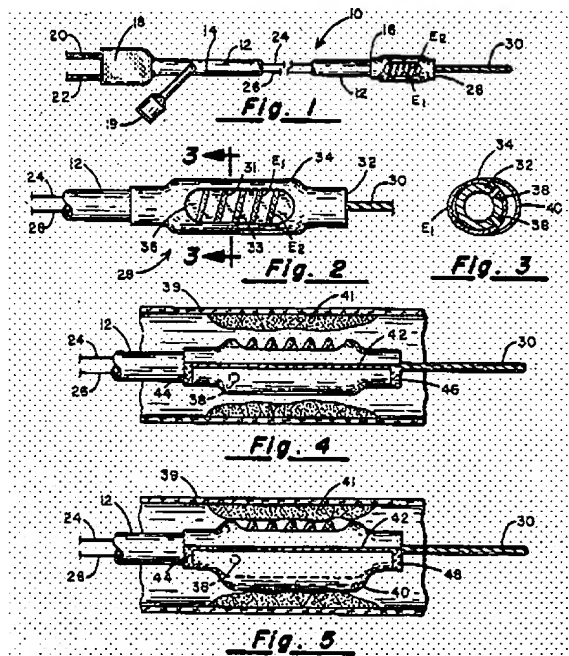
After a complete review of the previous action and applicant's comments, the examiner conducted a secondary search and found relevant art pertinent to the prosecution of this application. Accordingly, the following rejections address the teachings of the prior art found with respect to the pending claims.

***Claim Rejections - 35 USC § 103***

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

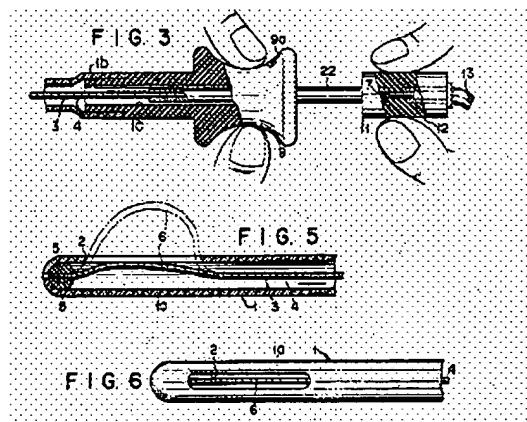
(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

**Claims 1, 10, 19, and 26** are rejected under 35 U.S.C. 103(a) as being unpatentable over **Parins, et al.**, in view of **Okada, et al.**, and/or **Tihon, et al.**



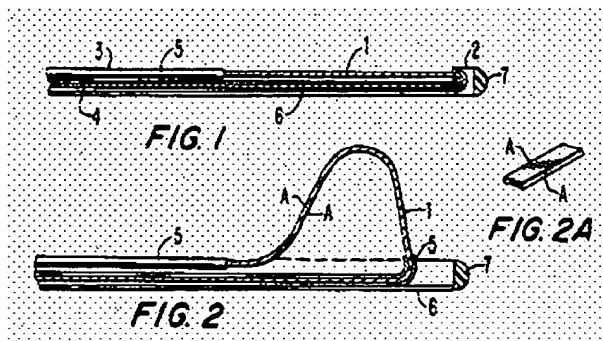
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In figures 1-5, the Parins, et al., Patent shows an elongate catheter defining a compartment within the catheter having one window through the catheter wall open to the compartment; a cutting element and a control component coupled to the cutting element. Parins, et al., does not teach the use of a cutting element compressible into a reduced diameter when positioned within the compartment and tending to radially expand beyond the catheter wall when positioned near the window. However, the use of cutting elements that radially expand through a catheter window is conventional in the art as evidenced by the teachings of Okada, et al., and Tihon, et al.



In figures 3, 5, and 6, **Okada, et al.**, teaches the use of a cutting element compressible into a reduced diameter and tending to radially expand beyond the catheter.

Additionally, Tihon, et al., shows in figures 1 and 2 (below), the use of a cutting element compressible into a reduced diameter and tending to radially expand beyond the catheter.



Based on the above observations, it would have been obvious to modify cutting elements (E1, E2) in Parins, et al., with expandable cutting elements such as those disclosed by Okada, et al., and Tihon, et al. Clearly, the use of expandable/compressible cutting elements would enhance the accuracy of the surgical procedure and the ability of the catheter to come into contact with the affected tissue. Finally, in view of the conventionality of expandable/compressible cutting elements, modifying Parins, et al. with expandable/compressible cutting elements would have been considered an obvious design alternative.

**Claims 2-8, 11-14, 16-18, 20, 23-25, and 27-29** rejected under 35 U.S.C. 103(a) as being unpatentable over **Parins, et al., in view of Okada, et al., Tihon, et al., and/or Mueller, et al.**

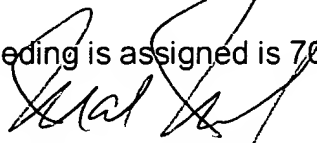
Parins, et al., shows in figure 5 the use of an expandable balloon (40) to increase the efficiency of the cutting elements. Mueller, et al., also teaches the use of an inflatable balloon(s) positioned at the distal end of the catheter. Accordingly, based on the above observations, the use of any expandable element(s) at the distal end of a catheter to improve the positioning of the cutting elements with respect to tissue would have been considered an obvious design alternative.

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**Conclusion**

The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Manuel Mendez whose telephone number is 703-308-2221. The examiner can normally be reached on 0730-1800 hrs.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Mr. Brian Casler can be reached on 703-308-3552. The fax phone number for the organization where this application or proceeding is assigned is 703-305-3590.



Manuel Mendez  
Primary Examiner  
Art Unit 3763